

**Electrode used for producing plasme body, plasma body processing  
equipment using said dectrode and plasma body processing using said  
equipment**

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A plasma treatment apparatus comprises plural pairs of electrodes for plasma generation, a treatment chamber for accommodating the electrodes therein, gas supply unit for supplying a plasma-generation gas such as rare gas into the chamber, and a power supply. A pulse-like or AC electric field is applied between the electrodes to generate dielectric barrier discharge plasma of the gas therebetween in the vicinity of atmospheric pressure, so that an object placed between the electrodes is treated by the plasma. At least one of the electrodes is provided with a tubular electrode substrate and a protection layer formed by heat-fusion coating a glass-based material on at least an outer surface exposed to plasma of the tubular electrode substrate. A withstand voltage of the protection layer is within a range of 1 to 50 kV.

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[54] 发明名称 用于产生等离子体的电极、使用该电极的  
等离子体处理设备以及利用该设备的等  
离子体处理

[57] 摘要

等离子体处理设备包括用于产生等离子体的多对电极、用于在其中容纳电极的处理室、用于将例如惰性气体的产生等离子体气体供给室的气体供给装置和电源。在电极之间施加脉冲或 AC 电压,以便在大气压附近产生气体的介质阻挡层放电等离子体,从而利用等离子体处理放置在电极之间的物体。至少一个电极备有管状结构的电极基底和在暴露给电极基底的等离子体的至少一个表面上的通过热熔涂覆玻璃基材料而形成的保护层。

